

Abstract of the Disclosure

A peptide derived from keratin, which can be used as a wound-healing agent. In one method for making the peptide, a keratin source such as human hair is washed, dried, and treated with an oxidizing agent such as peracetic acid for a time and temperature 5 sufficient to swell the keratin and oxidize some of the disulfide bonds to form sulfonic acid groups. The oxidation is believed to form a series of water-soluble peptides. The oxidized hair can be filtered, and the filtrate collected and concentrated under vacuum distillation to a viscous syrup, which can be neutralized with base. The concentrate can be mixed with an excess of a water-miscible organic solvent such as methanol, and the 10 precipitate collected and dried to form the wound-healing agent. The wound-healing agent is believed to include peptides having a molecular weight centered around 850 daltons and having at least one ionizable group such as sulfonic acid.